Applicant: Yoshihide MATSUO Application Serial No.: 10/787,360

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application.

- 1. (currently amended) A novel An isolated morphogenic and growth accelerating chemical substance 1 having the following physicochemical properties:
 - (i) color of substance: colorless;
 - (ii) molecular weight: 457;
 - (iii) mass spectrometry: FABMS:m/z 456 [M-H] (Fig. 1); and
 - (iv) nuclear magnetic resonance signal:
 - 1) ¹H-NMR(D₂O-20 mM Na₂HPO₄ (pH 9), 750 MHz): (Fig. 2)

 δ ppm 0.818 (3H; s), 0.837 (3H, s), 0.882 (3H, s), 0.960 (1H, m), 1.058 (1H, m), 1.167 (1H, m), 1.326 (3H, s), 1.37 (1H, m), 1.38 (1H, m), 1.40 (1H, m), 1.58 (1H, m), 1.61 (2H, m), 1.52 (1H, br d, J = 13 Hz), 1.76 (1H, br d, J = 14 Hz), 2.024 (1H, m), 2.181 (1H, dd, J = 4, 14 Hz), 2.291 (1H, dd, J = 14, 16.5 Hz), 7.698 (1H, d, J = 7.5 Hz), 7.845 (1H, d, J = 7.5 Hz); and

2) ¹³C-NMR(D₂O-20 mM Na₂HPO₄ (pH 9), 125 MHz): (Fig. 3)

δ ppm 15.236 (q), 19.037 (t), 20.287 (t), 20.955 (q), 21.835 (q), 25.987 (t), 33.381 (s), 33.636 (q), 37.308 (s), 39.590 (t), 41.199 (t), 42.346 (t), 52.769 (d), 56.381 (d), 79.096 (s), 114.965 (s), 124.399 (d), 139.004 (s), 141.232 (d), 150.282 (s), 152.656 (s), 172.081 (s), 173.538 (s), 174.661 (s).

Applicant: Yoshihide MATSUO Application Serial No.: 10/797,360

- (currently amended) The novel-chemical substance 1 according to claim
 which is obtainable from the YM-2-23 strain (FERM BP-8417).
- 3. (currently amended) The novel-chemical substance 1 according to claim1, which is represented by the following formula:

- 4. (currently amended) The novel-chemical substance 1 according to claim
 1, which has the molecular formula: C₂₅H₃₁NO₇.
 - 5. (canceled)
 - 6. (withdrawn) A compound represented by the following formula:

Applicant: Yoshihide MATSUO Application Serial No.: 10/797,360

- 7. (withdrawn currently amended) A process for producing a novel chemical substance 1, wherein microorganisms capable of producing the novel chemical substance 1 according to claim 1 are cultured in medium, the novel-chemical substance 1 is generated and accumulated in the cultures, and the generated and accumulated novel chemical substance 1 is recovered.
 - 8. (canceled)
- 9. (withdrawn) The production process according to claim 7, wherein the microorganisms are YM-2-23 strain (FERM BP-8417), or an analogous strain thereof.
 - 10. (canceled)
- 11. (withdrawn currently amended) Culture medium for algae comprising, as an active ingredient, the nevel-chemical substance 1 according to claim 1.
 - 12. (canceled)

Applicant: Yoshihide MATSUO Application Serial No.: 10/797,360

13. (withdrawn - currently amended) A monomethylated, dimethylated, or trimethylated form of the novel-chemical substance 1 obtained by treating the novel-chemical substance 1 according to claim 1 with trimethylsilyldiazomethane.

14. (withdrawn) A compound or a derivative thereof obtained by treating the trimethylated form according to claim 13 with sodium borohydride.